

**REMARKS**

In his Office Action, the Examiner alleges that the Reply filed on May 15, 2003 is not fully responsive to the prior Office Action because, in the Examiner's view, the amendment cancels all claims drawn to the invention constructively elected by original presentation. The Applicants respectfully disagree with this characterization of the Reply and also with the restriction/election requirement that the Examiner has made.

Seemingly critical to the Examiner's decision to divide out these claims is the presence or absence of the "quantum well intermixing" limitation. But these limitations were found at least in Claims 33 and 35 as last presented.

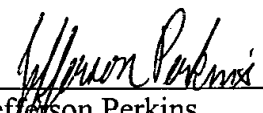
Nonetheless, in order to advance the prosecution of this case, the Applicants have added the "quantum well intermixing" limitation as well as a "gain profiling" limitation so that each of the independent claims surviving in the case (Claims 31, 34, 36 and 40) has these limitations, which also appeared in Claim 1 as originally presented in the application.

In view of these amendments, Applicants respectfully request the Examiner to withdraw his restriction/election requirement and to issue an early Notice of Allowance on the claims in their current condition.

No fee is thought to be due in conjunction with the submission of this Reply. However, the Commissioner is hereby authorized to charge any deficiency to Deposit Account No. 18-2284 of Piper Rudnick LLP, duplicate copy attached.

Respectfully submitted,

PIPER RUDNICK LLP

  
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Jefferson Perkins  
Registration No. 31,407

PIPER RUDNICK LLP  
P.O. Box 64807  
Chicago, Illinois 60440-0807  
Telephone: (312) 368-7073  
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